

What is Claimed is:

1. A method of providing a durable image on a substrate comprising the steps of:

coating a surface of the substrate with an aqueous mordant dispersion;
printing or transferring a selected image onto the coated surface;
optionally drying the image;
applying a dispersed hydrophobic material onto the image; and
drying the dispersed hydrophobic material.

2. The method of claim 1 further comprising the step of heating the substrate above ambient temperature after the step of drying the dispersed hydrophobic material.

3. The method of claim 1 wherein the aqueous mordant dispersion is selected from aqueous dispersions of mordants selected from the group consisting of polymeric dye mordants, inorganic metal containing colloids, polymer bound metal ion containing colloids, and combinations thereof.

4. The method of claim 1 wherein the selected image is transferred onto the coated surface.

5. The method of claim 4 wherein the image is transferred using a micro-embossed image transfer medium.

6. The method of claim 1 wherein the dispersed hydrophobic material is selected from dispersions of hydrophobic materials selected from the group consisting of fluoropolymers, silicones, polyvinyls, polyesters, polyurethanes, and combinations thereof.

7. The method of claim 1 wherein the aqueous mordant dispersion is dried prior to printing or transferring the image.

8. The method of claim 7 wherein the aqueous mordant dispersion is dried at a temperature of 100 °C or less.

9. The method of claim 7 wherein the aqueous mordant dispersion is dried at ambient temperature.

10. The method of claim 1 wherein the dispersed hydrophobic material is dried at a temperature of 100 °C or less.

11. The method of claim 1 wherein the dispersed hydrophobic material is dried at ambient temperature.

12. The method of claim 1 wherein the image is dried at a temperature of 100 °C or less.

13. The method of claim 2 wherein the substrate is heated until the dried hydrophobic material becomes hydrophobic.

14. A method of providing a durable image on a substrate comprising the steps of:

coating a surface of the substrate with a mixture comprising an aqueous dispersion of a mordant and a dispersed hydrophobic material;

printing or transferring an image onto the coated substrate; and

drying the image and the coated mixture of dispersed mordant and hydrophobic material.

15. The method of claim 14 further comprising the step of heating the substrate above ambient temperature.

16. The method of claim 14 wherein the image is transferred using an image transfer medium.

17. The method of claim 16 wherein the image transfer medium is a micro-embossed image transfer medium.

18. The method of claim 14 wherein the image and said coated mixture is dried at a temperature of 100 °C or less.

19. The method of claim 14 wherein the image and said coated mixture is dried at ambient temperature.

20. The method of claim 14 wherein the aqueous mordant dispersion is selected from aqueous dispersions of mordants selected from the group consisting of polymeric dye mordants, inorganic metal containing colloids, polymer bound metal ion containing colloids, and combinations thereof.

21. The method of claim 14 wherein the dispersed hydrophobic material is selected from dispersions of hydrophobic materials selected from the group consisting of fluoropolymers, silicones, polyvinyls, polyesters, polyurethanes, and combinations thereof.

22. A method a providing a durable image on a substrate comprising the steps of:

coating a surface of a non-porous substrate with an aqueous fluoropolymer dispersion;

printing or transferring an image onto the coated non-porous substrate; and heating the printed or transferred image above ambient temperature.

23. The method of claim 22 wherein the coated aqueous fluoropolymer dispersion is dried at ambient temperature prior to printing or transferring the image.

24. The method of claim 22 wherein the printed or transferred image is heated until said dispersed fluoropolymer becomes hydrophobic.

25. The method of claim 22 wherein the printed or transferred image is heated at a temperature of from above ambient to 100 °C.

26. The method of claim 22 wherein the non-porous substrate is a polymeric film, painted surface, glass, or metal.

27. An article imaged by the method of claim 1.

28. An article imaged by the method of claim 14.

29. An article imaged by the method of claim 22.

30. A kit for providing a durable image on a substrate comprising:
an image transfer medium;
aqueous mordant dispersion; and
dispersed hydrophobic material.

31. The kit of claim 30 wherein the aqueous mordant dispersion and the dispersed hydrophobic material are combined into a mixture.

32. The kit of claim 30 wherein the aqueous mordant dispersion and the dispersed hydrophobic material are separate.

33. The kit of claim 30 wherein the image transfer medium is a micro-embossed image transfer medium.